6. (**Amended Twice**) The method of claim 1, wherein said interaction leads to the formation of a transcriptional activator that comprises a DNA-binding domain and a transactivating protein domain and is capable of activating a response moiety driving the activation of said readout system, wherein said DNA-binding domain and said transactivating protein domain are separately encoded by said at least two different genetic elements.

65. (**Amended Twice**) A kit for performing a method for the identification of at least one member of a pair or complex of interacting molecules, comprising:

(A) at least one set of host cells, each comprising a readout system which allows host cells to be visually differentiated upon activation of said readout system;

(B) at least one genetic element comprising a selectable marker and genetic information encoding an activation domain or a DNA binding domain, which activation domain and DNA binding domain are together able to activate said readout system; and

(C) at least one visual means for visually differentiating host cells in different activation states of said readout system, wherein said visual means include digital image capture, storage, processing and/or analysis.

REMARKS

Upon entry of the instant amendment, claims 1, 2, 4-82, and 84-88 constitute the pending claims in the present application. Among them, claims 60-62 and 67 are withdrawn from further consideration as being directed to non-elected inventions or non-elected species. Applicants will cancel claims directed to non-elected inventions upon indication of allowable subject matter. Claims 1, 2, 4-59, 63-66, 68-82, and 84-88 are presently under consideration.

Applicants have amended claims 1 and 2 to clarify the subject matter being claimed. Applicants submit that there is no narrowing in scope due to these amendments. Applicants have incorporated the subject matter of claim 83 into claim 65, and canceled claim 83 as a result. Applicants have also added new claims 86-88. Support for these amendments can be found throughout the specification. For example, when referring to genetic elements subjecting to pre-selection, the specification refers to the DNA binding domain and the activation domain in

alternative ("or"). Specifically, the paragraph bridging pages 4-5 supports the embodiment of pre-selecting the genetic elements encoding the DNA binding domain.

Applicants also note that the supplemental IDS filed on August 20, 2002 has been considered in full by the Examiner.

Applicants respectfully request reconsideration in view of the following remarks. Issues raised by the Examiner will be addressed below in the order they appear in the prior Office Action.

Claim rejections under 35 U.S.C. 112, first paragraph

Claims 1, 2, 4-59, 63-66, and 68-85 are rejected under 35 U.S.C. 112, first paragraph, because the specification allegedly does not enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make/use the invention commensurate in scope with these claims.

Particularly, the Office Action argues that step (c) combines at least two genetic elements in host cells, neither of which are required to be screened in the host cells in step (b), thus leaving the host cells with unscreened genetic elements which arbitrarily may activate the read-out system without any interactions as desired in lines 1-2 of claim 1.

Applicants submit that the original step (C) recites "at least one set of host cells grows on said selective medium specified in (B)," thus constitute the screening (or pre-selection step) mentioned by the Examiner. Although pre-selecting just one set of host cells with one genetic element may yield more false positives than pre-selecting two sets of host cells (each with one genetic element), it still significantly eliminates false positives, and is thus enabled. Nevertheless, Applicants have amended claim 1 to clarify the subject matter claimed. Applicants have also added a new dependent claim 86 directed to the embodiment where two sets of host cells are pre-selected in step (B).

Applicants wish to point out that, while desired, the instant claimed invention does not *depend* on complete elimination of false positives by pre-selection. As long as a significant reduction of background is achieved through pre-selecting at least one set of genetic elements, the

claimed invention is enabled to allow a skilled artisan to conduct previously next-to-impossible screens (such as library-against-library screens). In reality, it is the set of genetic elements encoding the DNA binding domain fusion protein that usually causes the most false positive troubles. If that set of genetic element is pre-selected, additional pre-selection against the other set of genetic elements frequently does not significantly improve the background noise. Similar claim amendments are also made in claim 2.

Accordingly, all amended claims are enabled to their full scopes. Reconsideration and withdrawal of rejection under 35 U.S.C. 112, first paragraph is respectfully requested.

Claim rejections under 35 U.S.C. 102

Claims 65 and 66 are rejected under 35 U.S.C. 102 (b), as being anticipated by Vidal et al. Claim 65 are rejected under 35 U.S.C. 102 (b) and (e), as being anticipated by Fields et al.

To expedite prosecution, Applicants have amended claim 65 to incorporate the subject matter of its dependent claim 83 (which was not rejected by the Office Action), thereby obviating this rejection. As a result, claim 83 is canceled. Applicants reserve the right to prosecute claims of identical or similar scopes in future applications.

Applicants submit that neither Vidal nor Fields teaches or suggests any of the subject matter encompassed by the original claim 83, therefore the amended claim 65 and all its dependent claims are not anticipated by the cited references. Reconsideration and withdrawal of the rejection is respectfully requested.

Claim rejections under 35 U.S.C. 103 (a)

Claims 65 and 66 are rejected under 35 U.S.C. 103 (a), as being unpatentable over Fields et al. (U.S. Pat. No. 5,283,173).

Pursuant to MPEP 2143, "To establish a *prima facie* case of obviousness, three basic criteria must be met. First, there must be some suggestion or motivation, either in the reference

themselves or in the knowledge generally available to one of ordinary skill in the art, to modify the reference or to combine reference teachings. Second, there must be a reasonable expectation of success. Finally, the prior art reference (or references when combined) must teach or suggest all the claim limitations."

In view of the amendment to claim 65, Applicants submit that Fields does not teach or suggest any of the subject matter encompassed by the original claim 83. In addition, there is no motivation to combine Fields with any other cited prior art to reach the claimed kits. And it necessarily follows that a skilled artisan will have no reasonable expectation of success in arriving at the claimed invention.

Therefore, in view of the amendment to claim 65, none of the three requirements for establishing a *prima facie* case of obviousness is met. Accordingly, Applicants respectfully request reconsideration and withdrawal of this rejection.

CONCLUSION

For the foregoing reasons, Applicants respectfully request reconsideration and withdrawal of the pending rejections. Applicants believe that the claims are now in condition for allowance and early notification to this effect is earnestly solicited. Any questions arising from this submission may be directed to the undersigned at (617) 951-7000.

If there are any other fees due in connection with the filing of this submission, please charge the fees to our **Deposit Account No. 18-1945.** If a fee is required for an extension of time under 37 C.F.R. § 1.136 not accounted for above, such an extension is requested and the fee should also be charged to our Deposit account.

Respectfully Submitted,

Date: December 19, 2002

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